AMERICAN MEDICAL TIMES

Being a Weekly Series of the New York Journal of Medicine.

No. XIX. Vol. VIII. } New Series. NEW YORK: SATURDAY, MAY 7, 1864. { *Mail Subscribers, $3 per Ann. City and Canadian, 3 50 " Single Numbers, 10 cents.*

ORIGINAL LECTURES.	Page
Lectures on Gunshot Injuries of the Chest. By Frank H. Hamilton, M.D.	217

ORIGINAL COMMUNICATIONS.	Page
Certain Points in the Surgical Treatment of Diseases of the Rectum. By W. H. Van Buren, M.D.	218
Case of Equinea. Reported by John A. Spencer, F.R.C.S.I.	221

REPORTS OF HOSPITALS.	Page
Clay General Hospital, Louisville, Ky.	
Cases of Cerebro-Spinal Meningitis, communicated by Alex. T. Watson, M.D.	222

EDITORIAL ARTICLES.	Page
Mortality in Hospitals	224
Success of the Floating Hospital	225
Meeting of the American Medical Association	225
Commissioners of Quarantine	225

OBITUARY.	Page
John Redman Coxe, M.D.	226
Franklin Bache, M.D.	226

ARMY MEDICAL INTELLIGENCE.	Page
Orders, Changes, etc.	226

MEDICAL NEWS.	Page
Meteorology and Necrology of the Week in the City and County of New York.	

Original Lectures.

LECTURES ON GUNSHOT INJURIES OF THE ABDOMEN.

By FRANK H. HAMILTON, M.D.,

PROF. OF MILITARY SURGERY AND FRACTURES AT BELLEVUE HOSP. MED. COLLEGE, AND LONG ISLAND COLLEGE HOSPITAL; SURGEON TO BELLEVUE HOSPITAL; LATE MEDICAL INSPECTOR, U.S.A.

LECTURE VI.—PART I.

Second—Perforating Gunshot Injuries of the Abdomen.

Of these there are two classes, namely, those in which all of the important viscera have escaped a rupture or other serious lesion, and those in which more or less of the viscera have been wounded.

Let us consider, first, *those in which all the important viscera have escaped a rupture or other serious lesion.*

In the vast majority of cases, no matter what missile has been employed, if it has actually passed through the abdominal cavity, some of the contents of this cavity have suffered absolute lesion. The most frequent exceptions are found in the case of the smooth, round ball, and of smaller shot. The conical ball and the larger shot rarely turn aside themselves, or permit any of the viscera to move out of their way, in their course through the abdomen. But even these projectiles furnish a certain number of rare and almost unaccountable exceptions.

Much will depend upon the region through which the ball has penetrated, in estimating the chances that the viscera may have escaped. Thus it will be found that lesions of these organs occur most frequently in either of the hypogastric regions; and these wounds furnish the largest number of fatal results. In the remaining regions the serious internal lesion and the fatality of the wounds may be arranged upon a descending scale in nearly the following order:—Epigastric region, umbilical, right and left lumbar, hypogastric, right and left inguinal. Indeed so frequently do the viscera escape injury when the ball has passed through the inguinal regions, we cannot but conclude that, in very many of the examples, the missile has made its *trajet* below and outside of the reflections of the peritoneum.

My notes furnish me with six of these fortunate cases, five of which occurred in the inguinal region, and in all of these latter the bones of the pelvis were penetrated; one occurred in the lower part of the left lumbar region, and the bones of the pelvis were not injured. The cases are as follows:—

Case I.—Clement Grant, a private in the 22d N. Y. Vols., Inf., was wounded Sept. 17th, 1862, at Antietam, by a ball which entered the right groin, above Poupart's ligament, between the external and internal inguinal rings, and escaped on the nates, a little to the outside of the right tuber ischii. He walked one mile after being wounded. About three weeks after the receipt of the injury I saw this man at Frederick City, Md. The wound upon his nates was then discharging pus quite freely, and he only complained of occasional pains in the right thigh. It is probable that some of the pelvic bones were broken, but no fragments had escaped. None of the viscera of his abdomen had suffered injury, and there was no tenderness over the abdomen, except near the anterior wound.

Case II.—George Knoll, of the 7th Va. Vols., was wounded at Williamsburg, Va., in May, 1862. A ball entered just back of the left trochanter major, and passing forwards and towards the centre of the body, made its escape in front near the situation of the internal abdominal ring. The wounds were treated with cool water dressings. He was only confined to his bed five days, and in a short time he returned to his regiment perfectly sound. I saw him after the battle of Antietam, lying in the hospital under treatment for a wound of the thigh which he had just received.

Case III.—Jasper Haynes, private, 157th N.Y. Vols., 11th corps, wounded at Gettysburg, first day (July 1, 1863), by a conical ball, which entered just above the anterior superior spinous process of the ilium, on the left side, and escaped on the back, passing through the left side of the pelvis, near the sacrum. He immediately fell to the ground, and felt numb over his whole body and faint. The wound bled very freely, but he soon arrested the bleeding by a silk handkerchief made into a wad and secured by a towel tied about the body. He lay upon the field twenty-four hours. No treatment was subsequently adopted, except the application of a piece of adhesive plaster and cool water dressings over the whole side of the abdomen. Peritonitis was developed within a short time, and then warm flaxseed poultices were substituted for the cold water dressings. A number of fragments of bone have escaped, and other fragments can still be discovered in the wound. Suppuration continues after the lapse of nine months. Fæces have never escaped through either wound.

The fragments of bone in this case have, no doubt, perpetuated the suppuration; and, as they came alone from the pelvis, near the point of exit of the ball, and must have lain between the bone and the integument, they ought to have been removed at the first dressing, by the surgeon.

Case IV.—A Confederate soldier of the 51st Ga. was wounded at Antietam by a conical ball weighing one ounce. The ball entered back of the right trochanter and passed out through the left side of the abdomen in front, about opposite the internal abdominal ring. The patient found the ball projecting partly through the skin, and pulled it out himself. Twenty-three days after, I found him free from fever and with but very little inflammation, the wounds discharging moderately. No fæcal matter or urine had ever escaped by the wounds. He had been treated by rest and cool water dressings alone.

Case V.—While I was stationed at Yorktown, Va., on the staff of that gallant and vigilant officer, Major-General Keyes, the enemy made frequent attempts to surprise and drive in our outposts. On one of these occasions, the 9th of September, 1862, a force of rebel cavalry fell suddenly upon the camp of the 5th Pa. cavalry, stationed near Williamsburg. Among the wounded who were brought in and placed under my care was private Jacob Walter, who had received a round ball, perhaps a large pistol ball, through the right wing of his pelvis; after penetrating the bone it passed forward about four inches, and made its escape just in front of the anterior superior spinous process of the ilium. The hole through the bone was round and smooth, admitting easily the forefinger of my right hand; and it was evident, from its course through the integument, muscle, and bone, as compared with its course after it had entered the cavity of the belly, that its direction had in some way been changed, the deflection from its original course being, at the point of exit, at least fifteen degrees.

The viscera of the abdomen were not wounded; the shock from the injury was very slight; and when I last saw this man, a few days later, the wounds were doing well.

Case VI.—On the same occasion I dressed the wounds of E. A. Hass, a private in the same regiment, who was shot through the lumbar region, on the left side, just above the top of the pelvis, the wounds of entrance and of exit being about seven inches apart. In this case also the intestines were uninjured and the wounds closed rapidly.

There are many cases in which we are not able to declare at once, in the first examination, whether the viscera have been ruptured or not. It will seldom if ever be proper to introduce a probe or to lay open the wound for the sole purpose of deciding this point. If blood passes by the stomach or bowels, or if the contents of the hollow viscera escape externally, the diagnosis is clear; the presence or absence of tympanitis is also a sign of great importance, and in some cases the internal effusions can be plainly made out. Very much may be inferred, moreover,

from the severity of the symptoms and from their persistence or steady increase in gravity; but it is possible that very grave symptoms may ensue, and even death may result speedily, when there has been no such lesion. It will be impossible, therefore, in some instances, to make out the diagnosis fully until the results have been obtained, and even then it is often a negative rather than any positive testimony upon which we must rely.

If, then, no blood is thrown from the stomach or is passed by the bowels; if the faintness, nausea, and prostration are only moderate; if the patient suffers but little pain, and there is no tympanitis; if the consequent peritoneal inflammation is not great, and percussion gives no indication of effusion; finally, if after the lapse of several days none of the contents of the viscera are found to escape through the wounds and the general symptoms continue to improve, it will be fair to assume that no important internal organs have suffered serious lesion. And to this conclusion we shall arrive with additional assurance if the wound is situated in the inguinal region or in the lower part of the lumbar.

The treatment of these injuries ought always, at least so long as a doubt remains in relation to the exact diagnosis, to be based upon the same principles which are to govern the treatment of gunshot wounds penetrating the viscera. After having made such an examination of the wound of entrance as may be necessary and proper to determine whether any foreign substance has entered and been left in the track near the point, both orifices should be immediately closed. The patient should be laid in bed in such a position as to secure rest and relaxation of the muscles; the stomach should be kept empty and the bowels quiet with opium; warm fomentations should be applied, and such antiphlogistic remedies employed as the circumstances may indicate. In no case ought the probe or the fingers to be introduced beyond or through the walls of the abdomen in search of foreign substances or for the purpose of determining the nature and extent of the injury. Upon all these points I shall speak more at length hereafter when treating of those examples in which the viscera have been actually wounded.

In the January number, for 1859, of the *Buffalo Medical Journal*, I published an account of a case of perforation of the belly by an iron rod, which occurred in the practice of Dr. Throop, Luzerne Co., Pa. The report is substantially as follows:—In February, 1845, a young man, aged about twenty-five, a harness and saddle-maker by trade, got upon a table for the purpose of speaking through a trap-door with a shoemaker who occupied the room above him. The shoemaker, in sport, offered to throw a last at the saddler's head; in dodging to avoid which, the latter lost his balance, falling forwards, and encountering in his descent an iron rod used for filling collars, which was four and a half feet in length, nearly half an inch in breadth at the point, and expanding rapidly to a breadth of five-eighths of an inch, but slightly flattened in the opposite diameter. The surface of the rod was rough, having been only recently forged by a common blacksmith. It entered the abdomen four inches below the umbilicus and two inches to the right of the median line, and came out upon the back on the same side, two inches from the centre of the spine and about opposite the last dorsal vertebra. He immediately arose and pulled out the rod himself; he then walked across the street and sent for Dr. Throop; Dr. T. examined the wounds, which had bled only a few drops, and closed them with adhesive plaster. The patient was ordered to be kept upon a low diet, and his bowels were to be moved occasionally by an enema.

Dr. A. Knapp, who reported this case to me, saw him on the eighth day after the accident, and found him sitting up in bed amusing himself with his violin. He declared that he had suffered no pain except a slight stinging sensation when he drew out the rod, and that he now felt no inconvenience except from hunger and the consequent exhaustion. Subsequently Dr. Knapp saw him at work at his trade as usual, his recovery being complete.

Guthrie relates a very similar case, a soldier having been completely transfixed by a ramrod. The small end entered about two inches below the umbilicus, and, penetrating the second lumbar vertebra, protruded an inch and a half on the opposite side. It was removed, and his recovery took place in a short time and without a single grave symptom.

Original Communications.

CERTAIN POINTS IN THE SURGICAL TREATMENT OF DISEASES OF THE RECTUM.*

By W. H. VAN BUREN, M.D.,

PROFESSOR OF ANATOMY IN THE MEDICAL DEPARTMENT OF THE UNIVERSITY OF THE CITY OF NEW YORK.

My motive in asking the attention of the Academy to *certain points in the surgical treatment of diseases of the rectum* is to elicit the experience of its members, and to determine the actual value of certain remedial measures I have employed for some time past, which seem to me to possess a decided advantage over the modes of treatment in general use. I have nothing original to propose, and shall simply give my own experience in carrying out the ideas of others, which have not received the degree of attention which they appear to me to deserve; hoping thereby to contribute to the more ready relief of some of the most common and painful diseases encountered in the practice of our art.

My first point involves the consideration of the best mode of exploring the rectum by the aid of the speculum. Before the employment of anæsthetics, even with the variety of specula devised for the purpose, this procedure was, in my experience, unsatisfactory. The power of rendering a patient unconscious has proved of immense assistance; but, in order to effect the object thoroughly, it is necessary, after the full influence of the anæsthetic has been produced, to place the patient in a particular position, as well as to secure the best possible light. The position which I have found most advantageous is that employed by our colleague, Dr. Marion Sims, in his very successful operations upon the vagina and neck of the uterus, the superiority of which he first recognised and pointed out, as detailed in his paper on "Silver Sutures."

The patient is placed with the upper part of the trunk in a prone position, the front of the thorax in contact with the bed or table, the head on its left side, the left arm brought out at the left side and carried behind the back, the pelvis on its left side, with the thighs flexed at a right angle, and the buttocks exposed towards the light, and elevated sufficiently to permit the abdominal viscera to gravitate towards the diaphragm. These details may seem unnecessarily minute, but those who have witnessed the operations of Dr. Sims will bear witness that they are easily carried out in practice, and that the position secures great advantages to the operator by permitting the air to enter and freely expand the vagina, thus relieved from the pressure of superincumbent organs. In exploration of the rectum the same advantages are obtained as soon as the *sphincter ani* is dilated by the introduction of the speculum. The speculum I employ is a modification of that used for the vagina by Dr. Sims; the modifications consisting in the notch at its angle intended to receive the sphincter muscle, and thus to resist the tendency of the instrument to slip out when the muscle is put upon the stretch, and the alteration of the handle, which is so shaped as to clear the buttock when it is swept around, so as to bring all sides of the cavity of the gut into view. To facilitate still further this latter manœuvre, and to protect the stretched mucous membrane from abrasion, the edges of the blade are carefully rounded and turned inwards.

* Read before the N. Y. Academy of Medicine, December 16, 1863.

The speculum being introduced and the sphincter put upon the stretch with one hand, the other hand is used to draw away the parts on the opposite side of the orifice; and, the handle of the instrument being then gradually swept around, the light falls successively upon all sides of the exposed and expanded cavity. By the use of this manipulation applied to a patient in the position just described, I have frequently obtained a satisfactory view of the whole extent of the cavity of the rectum as high as its upper curve.

The next point to which I would ask your attention is the treatment of *fissure*, or, as the disease is more properly named, *irritable ulcer of the rectum*.

Fissure of the anus, or laceration of the mucous membrane of the rectum just within the anal orifice, is, I suspect, an accident of frequent occurrence, and it is almost invariably produced at stool by the effort of straining to extrude a mass of hardened faeces. Most simple fissures thus produced probably heal at once and give rise to no subsequent trouble; but when the subject of the accident is in a disordered condition of system, or when the costiveness persists, and the passage of the hardened stools is of constant recurrence, the fissure is prevented from healing, and is transformed into an unhealthy and irritable ulcer, which soon becomes the seat of severe and stinging pain of a peculiar character, and singularly disproportioned in amount to the trifling extent of the lesion. This disease is well described by Curling, Quain, Ashton, and other writers on diseases of the rectum. The ulcer is generally, although not invariably, situated on the posterior wall of the gut, and it takes an oblong shape from that of the fissure in which it has its origin. In many cases its lower extremity can be brought into view by gently forcing apart the borders of the anal orifice.

The treatment advised by the authorities above cited for this most painful affection comprises two plans.

The first includes laxatives, enemata, and escharotics or healing ointments applied directly to the ulcer. If these means do not succeed, and their success is a rather rare exception to the rule, division of the sphincter ani by the knife, as first proposed by the French surgeon, Boyer, many years ago, is the alternative. This remedy is generally prompt and certain; but it is a cutting operation, requiring some little time for recovery, and patients, through exaggerated fear of the knife of the surgeon, will often continue to suffer rather than submit to it. There is another operation, not involving the use of the knife, and bloodless in character, which is equally prompt and sure, and which need not confine the patient to his bed more than a single day. I refer to *forcible dilatation* of the *sphincter ani* muscle. This process has been employed, I am aware, by several of my surgical friends; but I think that its simplicity, safety, and thorough efficiency as a substitute for the knife is not as generally appreciated by the profession as it should be. According to my belief, it is the proper remedy for the disease under consideration, and a glance at the pathology of irritable ulcer and the physiological condition of the sphincter muscle, will, I think, establish the position.

The immediate cause of the peculiar and insupportable pain of an irritable ulcer of the rectum is the constant and involuntary spasmodic contraction of the sphincter ani muscle, by which the sensitive sore is continually squeezed and pinched. This explanation is in accordance with the latest pathological researches. In the Transactions of the Academy of Sciences of Paris, of the eighth of June last, the result of certain experiments made in his laboratory by MM. Gianuzzi and Newrocki was presented by Prof. Bernard, of the College of France, as to the "influence of the nerves upon the sphincters of the urinary bladder and anus." This is their conclusion:—

"The preceding experiments appear to us to demonstrate that the sphincter muscles of the bladder and anus are, during life, in a constant state of tonic or involuntary muscular contraction, which state is due to the influence of their nerves."

Now, it is fair to infer that the presence of a painful ulcer, seated on that portion of the mucous membrane of the rectum which is grasped by its sphincter muscle, through the medium of reflex action, greatly intensify the nervous influence which stimulates this contraction. And the fibres of the muscle thus stimulated to constantly increased spasmodic effort are continually subjecting the already tender sore to the mechanical violence of compression and bruising, by which it is at the same time prevented from healing and rendered so exquisitely painful. It must also be remembered, as shown by Todd and Bowman, and Brown-Sequard, that the fibres of a muscle, when stimulated to action, either by the will directly, or indirectly by reflex irritation, do not contract simultaneously and then relax altogether; but that each separate fasciculus or bundle of ultimate fibres (the aggregate of which make up the muscle) contracts and relaxes by itself, each, to a certain degree, independently of its neighbor; and thus, like the keys of a piano under the fingers of a rapid performer, all these separate fasciculi, as long as the stimulating cause continues, are playing in succession upon the painful ulcer.

The pain thus produced varies both in degree and in duration. It may be slight and transient, or it may be almost insupportable in severity, and last eight or ten hours. The act of defecation itself is often accompanied by a slight degree only of soreness, and there is generally an interval of ease after the defecation before the peculiar pain of the disease sets in, and this interval is longer if the stool be solid in consistence.

If this view be correct as to the cause of the pain in this disease, it follows that any means by which the contractile power of the sphincter is interrupted or temporarily abolished will relieve it at once. Its division by the knife illustrates the fact. Now, it is well known that forcible stretching of muscular tissue will temporarily impair its contractility. The paralysis of the bladder which so often follows its over-distension in retention of urine, is an example of this. And thus it is explained why forcible dilatation or stretching of the anal orifice arrests at once the pain of an irritable ulcer of the rectum, and is followed by its speedy cure. That this result is safe, sure, and reliable, can only be demonstrated by clinical facts, and these I will endeavor to furnish.

Richard Quain, in his excellent treatise on diseases of the rectum, after stating that the interval that elapses between the evacuation of the bowels and the occurrence of pain varies from ten minutes to two hours, adds: "I cannot explain at all satisfactorily why an interval of time elapses between the application of the exciting cause and its effect; nor can I account for the variations in its length." To me it seems plain that the dilatation to which the orifice of the anus is subjected by the extrusion of faeces during the act of defecation is sufficient to prevent the fibres of the sphincter muscle from resuming their full tonic contractility for a short interval, and that the length of the interval depends entirely upon the size and hardness of the mass extruded, and the amount of stretching to which the orifice has been subjected.

Now, the operation of forcible dilatation, as I have been in the habit of performing it, by introducing the two thumbs into the anus, flexing them so as to include the breadth of the sphincter muscle, and then, taking a purchase with the outstretched hands from either buttock, drawing them forcibly asunder until arrested by the ischial tuberosities, effects such a stretching of its fibres as to paralyse the sphincter for at least a week, during which time the ulcer assumes a healthy appearance and rapidly heals, the pain ceasing entirely from the time of the operation.

Case.—A gentleman of 45 was under my care for chronic phthisis in 1861, and, through change of diet and habits, and removal to the country, improved very much in health. Early in the present year he came to the city for relief, having relapsed for several months in consequence of suffering severe "agonizing" pain after going to stool, which had led him to neglect the calls of nature. His

appetite was gone, and he was losing flesh. The present trouble has its origin in costiveness. He had no great pain at the time of defecation, but about half an hour afterwards an indescribable smarting, stinging, and boring pain would come on, and last for three or four hours. I suspected the cause of his trouble, and the next day, with the assistance of Dr. Foster Swift, had him etherized, and explored his rectum. On its coccygeal aspect, just within the verge of the anus, we saw an unhealthy looking ulcer, about the size of the finger-nail, with elevated edges and a dirty, yellowish surface. I stretched the anus with the thumbs, in the manner above described, and ordered a dessert-spoonful of castor oil at bed-time. The operation was followed by no pain, and the next morning he had a stool without pain—"just the slightest possible feeling of soreness"—as he described it, and much to his gratification there was none of the "agony" afterwards. It has never returned; and with proper care he has regained a very fair condition of health. He was confined to the house one single day.

Case.—An English lady of 35 was sent to me by my friend Dr. Sabine, in 1861. She had been suffering excessive pain after defecation for more than a year, to relieve which she had resorted to the use of opium in considerable quantities. She was a woman of strong character and excellent morale, and, mortified by the habit she had acquired, she had determined to break it, and bear the "bitter pain," as she termed it, by embarking on a voyage to China to join her husband, without any opium in her possession, and with this resolution had come to New York. I examined the rectum, and finding an ulcer in the same part of the gut as in the last case, dilated the sphincter on the spot. A thrombus about the size of an English walnut formed around one side of the anus within a few minutes after the operation, but she complained of no after-pains. The next morning, accustomed to their use, she took an enema of tepid flaxseed tea, had a free evacuation, with very slight inconvenience, and no return of the "bitter pain." She went out every day, complained of little or no local soreness, and started on her voyage without any opium, and without any necessity for its use.

The thrombus in this case resulted from the rupture of a superficial vein. I have also, in several instances, lacerated the mucous membrane in dilating the anus, but have never seen the slightest trouble follow either of these accidents. The paralysed and quiescent condition of the sphincter after dilatation secures rest and protection from violence to the parts within its grasp, and the process of repair takes place at once, and is rapidly completed.

Case.—A perfectly healthy young lady was married at 22, and within a month after her marriage injured herself whilst straining at stool. From this time the act of defecation was always followed at a variable interval by intense and insupportable pain of several hours' duration. To avoid this she resisted the desire to have a passage, and gradually lengthened the interval to a week or ten days, when she would take a dose of medicine and suffer for twenty-four hours. She was treated in a western city at different times for piles and stricture, and was even suspected to have cancer, but, procuring no relief, she finally came to this city last spring, having suffered more than two years. She described her suffering after stool as excruciating; it lasted from eight to ten hours. Her husband told me that sexual intercourse brought on her pain. I found the sphincter ani very much contracted, but the introduction of the finger discovered none of the hardness of cancer, nor any evidence of stricture within its reach; but a rough and exquisitely sensitive spot towards the coccyx suggested the existence of irritable ulcer. With the assistance of my friend Dr. Emmet, she was etherized, and by the aid of the speculum the ulcer was brought readily into view, presenting the appearance described in a former case. There was no other evidence of rectal disease. I dilated the sphincter at once and thoroughly, and in doing so produced two linear lacerations of the mucous membrane, each three-quarters of an inch in length. Very slight soreness followed, and the next day, by the aid of a dose of castor oil, she had several large passages, which, for the first time in two years, were followed by no pain whatever. At my next visit her expressions of gratitude and surprise were very pleasant. At the end of a week we again used the speculum, and found the irritable-looking ulcer transformed into an innocent, healthy sore, with thin white edges and a granulating centre, presenting half its previous size. The lacerations produced by the operation had entirely healed, leaving no trace. She used daily enemata for another week, and then a dinner pill at night, as required, and when she left the city at the end of a month, was perfectly well.

Her long continued and severe suffering had given to this lady's face a painful expression, characteristic of her disease; and her complexion was sallow from habitual constipation. After her cure, the change in her appearance was remarkable.

I have been asked whether the paralysis of the sphincter ani, produced by forcible dilatation, is ever followed by incontinence or loss of control over the contents of the lower bowel. The relaxed and flabby appearance of the orifice of the anus after the operation certainly suggests this idea, and the fact that when the patient is asked to contract his sphincter by voluntary effort he generally expresses his inability to do so, looks in the same direction. But, in answer to the question, I must say that in upwards of twenty cases which have come under my observation, I have never seen any indications of incontinence, and that I believe the internal sphincter to be equal to any emergency likely to arise during the temporary suspension of the functions of the more powerful external muscle.

I have reason to believe that in some cases the muscular fibres of the sphincter are actually ruptured or torn in the stretching process; but no harm or delay in the cure has resulted from this. My colleague, Dr. W. R. Donaghe, tells me that, after doing the operation, he once felt distinctly through a laceration in the mucous membrane of the rectum a gap in the substance of the sphincter. The case did well, and the cure was perfect.*

This remedial measure has a wider application than to the treatment of irritable ulcer of the rectum. In inflamed hæmorrhoidal tumors, or any painful inflammatory affections of the anus, where the spasmodic contractions of the sphincter constitute the principal source of the pain and obstruction to the circulation, the stretching of the sphincter, with or without the intervention of an anæsthetic,

* The following is a note of Dr. Donaghe's case, which he has kindly furnished me:—

Case.—Timothy McMahon, aged 45, a stout, well built laborer, came to the Demilt Dispensary, August 1, 1862, complaining of "pain in the lower end of his bowel after a passage." He stated that his bowels had been generally regular, and that during the last four years he had been troubled with bleeding once or twice a year, lasting four or five days. His present complaint began six months before his visit to the dispensary. He said that he had a passage every morning, causing some sense of soreness as it came out, and that when it was over, *without any interval*, there began "a great pain," which he likened to that felt by a woman in labor; that it lasted about four hours; that after its cessation he felt perfectly well until the next day; but when the pain was upon him he could do nothing, so great was his suffering, and consequently he had been obliged to give up his daily labor. On examination with a rectal speculum I found several small internal piles; and in front of the coccyx, on the upper part of the mucous membrane lining the external sphincter, there was a small round ulcer, a little larger than half a pea, with a reddish and ungranulating surface and slightly thickened edges. I touched it thoroughly with nitrate of silver, but without relief. On August 23d I gave him ether, and, introducing the index and middle fingers of both hands into the rectum, I pressed slowly but firmly towards the tuberosities of the ischia. During this movement I felt a distinct sensation of something giving way, which I supposed to be the sphincter muscle. After this occurrence there was no further resistance, but the margin of the anus became very lax. I examined with my finger towards the coccyx, and recognised a distinct laceration of its mucous membrane, the rough edges of which could be easily felt; the joint of my finger imbedded itself in the submucous cellular tissue. He complained of severe pain when the effects of the ether passed off, and I gave him a grain of opium. On the third and fourth days he had passages, and said that the "straining was not felt." On the eighth day I saw him again. He had had a passage every day without subsequent suffering. I examined the part with a Sims speculum. In front of the coccyx there was a vertical, oblong sore about three-quarters of an inch in length and half an inch in breadth, covered with healthy granulations. I did not see him again for several weeks, at the end of which time examination showed that the sore had entirely healed and the mucous membrane was in a state of perfect integrity. I have seen him a number of times during this year (1863), and he has had no sign of relapse.

will afford prompt and certain relief. It is equally applicable to the affection described by some authors as "spasm," and by others as "painful contraction" of the sphincter* and also in the "neuralgia of the anus" of nervous subjects and hysterical women.

I have been in the habit for several years past of employing this manœuvre after the operation for the cure of hæmorrhoidal tumors, whether by ligature or the use of the *ecraseur*. The result has been always favorable. The patient is entirely saved from the severe pain, generally lasting several days, which is caused by the pinching of the tender and inflamed parts by the spasmodic contractions of the irritable sphincter. By throwing it out of play, the suffering after the operation is reduced to a very moderate degree of local soreness, and the necessity for the employment of the catheter, through sympathetic disturbance of the sphincter of the bladder, is abolished.

Case.—I was requested by Dr. R. F. Clow, of W. 27th street, to see one of his patients, who had been suffering for many years with "bleeding piles," and who was at the time confined to his bed with a very painful aggravation of his malady. I found a gentleman of thirty, pale, nervous, and broken down by loss of blood, complaining bitterly of throbbing and lancinating pain at the anus, accompanied by almost constant desire to go to stool. When he did so, he voided nothing but a little bloody mucus without relief; and this had lasted more than a week. On placing him in a position in which I could inspect the parts, I found a mass of inflamed rectum and hæmorrhoidal tumors protruding beyond and embraced by the sphincter; and detected also an elongated and unhealthy ulcer situated between two of the tumors. I greased my thumbs and gently introduced first one, and then the other, into the orifice in the centre of the protruding mass, and, grasping either buttock with the outstretched fingers, steadily and forcibly stretched the sphincter muscle. The pain was not as severe as might be supposed, and he allowed me to reduce the inflamed parts within the orifice. I promised him relief from his pain, and advised an operation for the radical cure of his piles and prolapse as soon as the inflammation should have subsided, and meanwhile that he should use a daily injection of tepid flaxseed tea with a Davidson's tube, to secure soft stools. At the end of a week I was informed that my operation had relieved the severe pain, and that he was ready to have his tumors removed. I explored his rectum the next day under ether, and found, in addition to the hæmorrhoids, not less than three ulcers, not very unhealthy in appearance, and situated between the tumors. I applied the ligature to four tumors, and finished by dilating the sphincter a second time. The patient had no severe pain after the operation, recovered rapidly under the judicious care of Dr. Clow, and presented himself to me at the end of a month entirely well and very much improved in health and appearance. He had a daily stool without pain, protrusion, or loss of blood, and was exceedingly grateful for the result.

I might continue to relate cases in which forcible dilatation of the sphincter ani has been employed with results not differing from those already stated, but fear to tire your patience. The cases I have described embrace most of the prominent points in connexion with the operation which my experience furnishes. I will only add that I have acquired great confidence in its efficiency as a substitute for the knife, and that its simplicity and the facility with which it is effected, together with its wide range of application as a prompt remedy in a common and very painful class of diseases, appear to me to justify its more general adoption as an established operation of surgery.

This operation was originally proposed by Recamier, of Paris, but I have been unable to find any record of its employment by his immediate successors. Some fifteen years ago I saw in the *Gazette des Hôpitaux*, of Paris, a proposition on the part of Maisonneuve to cure fissure of the anus by introducing the hand into the rectum, closing it firmly, and then withdrawing the closed fist by main force. This mode of operating met with no favor, although Maisonneuve states that he employed it successfully. Shortly after this I was told by my friend Professor Metcalfe, of this city, that he had stretched the sphincter ani in painful conditions of the anus with benefit.

Sedillot, in his Operative Surgery, published in Paris in 1855, speaks of forced dilatation as a remedy for fissure of the anus, and describes an operative process, but gives no results. Nelaton, of Paris, also alludes to it in highly favorable terms as worthy of trial since the discovery of anæsthesia, but gives no experience. I have heard of its employment in this city by Dr. Gurdon Buck, Dr. John Burke, of East Broadway, Dr. Isaac Cummings, and others.

On the other hand, I can find no allusion to it in any of the English works on Diseases of the Rectum.

* Boyer, *Traité des Maladies Chirurgicales*, etc. 4th edition. Tome x. pp. 139–150.
Dupuytren, *Leçons Orales*, tome iii., pp. 284–6.
Brodie, *Lectures on Diseases of Rectum*, in *Lon. Med. Gaz.* vol. xvi., p. 26.
Quain, *Diseases of the Rectum*, N.Y. 1855, pp. 177–180.

CASE OF EQUINEA.

REPORTED BY

JOHN A. SPENCER, F.R.C.S.I.

SURGEON 69TH REGIMENT (N. Y.), 2D BRIGADE, TYLER'S DIVISION, 22D ARMY CORPS, FAIRFAX STATION, VA.

Peter Brennan, æt. 46, of intemperate habits, a private in Company K, 69th Regt., was admitted into hospital on March 23, 1864.

Symptoms on Admission.—Pain, referred to the lower ribs on the left side, weakness, muscular trembling, costiveness. Pulse 75, fair; tongue moist and clean; temperature of skin normal; respiratory murmur and rhythm of heart natural. ℞ Magn. Sulph. ℥i.

History of the Case.—On the 15th inst. Brennan came to me with the statement that he was detailed to attend to an officer's horse, but that for the past few days he had not felt able to do his duty. Nothing abnormal could be detected on examination, and there were no data upon which to act, save the man's own story—that he did not feel well, and had a pain in his side; the question then arose, as to whether he was malingering, or suffering from pleurodynia. Finally it was decided to give him the benefit of the doubt, and accordingly he was relieved from duty for a few days and ordered to report occasionally, the following being prescribed: R. Ext. colch. fl. 10 min.; every two hours till it operates. R. Morphiæ sulph. gr. ss. each night at bed-time. On the 18th he came again, saying that he still felt unwell, though the pain was partially relieved; on this occasion a blister was applied to the affected part. His next visit was on the 20th, his complaint the same: R. Quin. sulph. gr. v. ter in die. The colchicum to be discontinued. On the 23d he was sent to hospital by Dr. Nealis, the Assistant Surgeon, who saw him in camp; he had to be carried thither on a stretcher.

Daily Reports.—March 24th.—He lies sunk down in the bed, on his back, with the knees drawn up; pulse 80, weaker than yesterday; tongue shows some disposition to dryness about the centre; does not answer *at once* when addressed; speaks of having great thirst; trembles like one in an ague fit; has had no rigor, as far as can be ascertained. Ordered the "Imperial" drink to be given him at intervals; a pint of beef tea for dinner. R. Liq. ammon. acet., a tablespoonful every third hour. 25th.—There is a dusky red hue about the nose and forehead; pulse 88, weak and compressible; tongue brown and dry in centre, red at edges and tip; bowels acted freely last night; motion healthy. Liq. ammon. acet. to be discontinued. R. Sp. frumenti ℥ii., quin. sulph. gr. v., four times a day; body to be sponged with tepid water; hair to be cut close to the head. 26th.—Perspired profusely yesterday evening; the trembling persistent; pulse 80, not so weak as before; tongue brown and dry; there are three unhealthy-looking pustules noticed

on the face, one at the root of the nose, between the eyebrows, almost large enough to fill this space, another on the forehead, and a third on the upper lip, below the left nostril. These three are precisely alike in appearance, and are each surrounded by a broad, dark livid margin. The attendant reports that the patient "wandered" during the night. Whiskey and quinine as before. 27th.—Last night he passed the fæces involuntarily; answers incoherently when spoken to; pulse 90, irregular and thread-like. The pustules noticed on the face yesterday have broken and discharged a thin, reddish, sanious fluid. The integument of the back is of a livid color, and there are patches of a similar hue on the lower limbs, which are also covered with pustules of about twice the size of those in small-pox; the scalp, too, is studded with these pustules. On the upper and anterior part of the left thigh is a tumour from one and a half to two inches in diameter; it is moderately hard, and if touched, the patient, semi-conscious, cries out. 8 P.M., pulse 120, intermittent; his fæces pass from him so frequently that it is necessary to have an India-rubber blanket kept under him and changed constantly; it is remarked that these discharges are very offensive. Directed a reliable man to remain up with him through the night and to give him an ounce of whiskey each hour as long as he could swallow. 28th, 8 A.M.—Could with difficulty swallow the stimulant. 10.30 A.M. Died comatose. No autopsy. The following points, connected with the case, may perhaps be considered worthy of attention:—

1. The absence of any marked febrile disturbance up to an advanced period of the disease. 2. The earlier symptoms simulating rheumatism. 3. The true nature of the affection being so completely masked till the pustules, etc., made their appearance. 4. The absence of the more aggravated symptoms of the disease in consequence, I think, of the poison acting upon the brain, and destroying life by that organ before the more horrible details of "glanders" had, as it were, *time* to be developed.

Before closing it is necessary to state that the horse Brennan had attended was, beyond all doubt, *glandered*, though in a sub-acute form. The animal (which I examined) had a persistent purulent discharge from the nostrils; small chancrous ulcers on the mucous lining membrane of those cavities, pustules on the skin, and the glands under the jaw were swollen, tender, and adherent.

Reports of Hospitals.

CLAY GENERAL HOSPITAL, LOUISVILLE, KY.

CASES OF CEREBRO-SPINAL MENINGITIS,

Communicated by ALEX. T. WATSON, M.D., U.S.V., Surgeon In Charge.

CASE I.—REPORTED BY FRED. C. LEBER, A.A. SURG. U.S.A.—Alfred Lockwood, a private of the 41st Regt. Ohio Vols., was admitted into Branch A, Clay General Hospital, on March 25, 1864, at eleven o'clock A.M., from the Military Prison in this city. I saw him immediately after admission. No previous history. I found him lying upon his bed, apparently in a semi-comatose condition, the head slightly drawn back, and the muscles of the neck rigid. The eyes were injected, the pupils dilated and fixed. The temperature of the skin was normal, excepting the scalp, where it was comparatively increased. Pressure made over the cervical vertebra gave conclusive evidence of pain. Pulse 90, soft and full; respiration tranquil; tongue coated with a whitish, cream-like fur; no vomiting; abdomen slightly tympanitic. When roused and questioned regarding himself or relatives, he would invariably give the same answer. When placed upright upon his feet, he would reel and stagger like a person under the influence of intoxicating drink. *Treatment.*—Six cups to be applied to nape of neck and temples, and eight ounces of blood to be extracted. The head to be kept constantly covered with cold cloths. A drop of ol. tiglii, made into a pill with bread crumbs, to be administered every hour, until his bowels are thoroughly evacuated. March 26th.—The nurse informs me that the patient has been very restless and talkative during the fore part of the night, but slept a little towards morning. Four drops of croton oil had been given, which produced three large evacuations. He has also passed a large quantity of high-colored urine; and I may here remark that during the whole course of the disease, the secretion of urine was increased. There is some improvement in the patient's condition; he is more rational, and answers questions put to him regarding his age, place of residence, etc., etc., pertinently and correctly. When left to himself he falls, however, into a state of busy, talkative delirium, and in his delirium he frequently carries the hand across his forehead, and cries out, "Oh, my head, it pains me so bad!" He is very restless, moving and tossing himself about in bed, and it requires the constant attention of one man to prevent him from falling out on the floor. Other symptoms the same as day before. R. Tart. emetic., gr. ij.; kali nitrici ℥ss; Aquæ ℥iv. M. A tablespoonful every two hours. March 27th.—During the night spots of irregular shape and various size made their appearance on various parts of the body. These spots are of a dark livid hue, not elevated above the surface, and do not disappear on pressure. They are thinly scattered over the entire surface, thicker around the joints, and most abundant on the lower extremities. The patient has been very restless during the night, throwing off his bed-clothes and making ineffectual attempts to get out of bed. His mind is now constantly wandering, and he does not recognise the physician, nor does he answer to a direct question. There is decided opisthotonos. The muscles of the neck are rigid and tender, and when attempt is made to raise him up in bed, he cries out from pain. The pupils are contracted; the whole face, but especially the lips and alæ of the nose, is of a dusky hue; tongue coated with a yellowish white fur; bowels have operated once during the night, and he has passed urine freely. There is evidently increased thirst, as he frequently calls for water. When food is presented to him he takes it greedily. Pulse 96, soft, and rather weak; respiration natural. I requested Surgeon Alex. T. Watson, U.S.V., and A. A. Surgeon D. Cummins, U.S.A., to see the patient, which they had the kindness to do. At their suggestion, croton oil was rubbed in over the entire length of the spinal cord. The medicine and cold applications to head to be continued. March 28th.—The patient is no better; has passed a restless night, with no sleep; spots have somewhat faded since yesterday; bowels have not acted since night before last, but has passed urine freely; the right pupil is irregularly dilated, the left contracted; other symptoms same as day before. The croton oil did not produce the desired effect, in consequence of which it was reapplied. Tartar emetic mixture to be discontinued. A tablespoonful of the following medicine to be taken every fourth hour: R. Potassii iodidi ℥j.; aq. dist., ℥iv.; M. To have beef-tea. March 29th.—The report to-day is that the patient rested somewhat more comfortably during the night, but did not sleep. Nevertheless, he is perceptibly growing weaker, and it is evident, from the symptoms, that the case is progressing towards a fatal termination. The croton oil has not produced a very copious eruption, although thoroughly applied. Pulse 106 per minute, soft and weak; tongue coated with a brownish black fur in the centre, but still moist. His bowels have not moved since the 27th, and there is now retention of urine. Abdomen tympanitic; there is no sensible increase of temperature; the right pupil is still dilated, the left oscillating, and it is also observed that there is occasional subsultus tendinum. Ordered the iod. potassii to be continued, and a teaspoonful of the following mixture to be given every two hours: R. Tinct. hyoscyami ℥ss.; aq. camphoræ ℥ij. M. March 30th.—At my evening visit yesterday, I ordered the nurse

to give the patient a few more of the pills of croton oil, with a view to empty his bowels, and although four of the pills were administered, they did not have the desired effect. Purgative enemata proved equally useless in overcoming the obstinate constipation. The patient has now assumed the dorsal position, with his thighs and legs semi-flexed; the toes flexed upon his feet, and the thumbs contracted and drawn into the palm of the hands. The subsultus has increased, and the patient is now constantly picking at the bed-clothes. His delirium is of a more passive character; he is incessantly talking; and his articulation is becoming difficult. His tongue is covered with a black crust, and his lips and teeth with sordes. Treatment to be continued; the head to be shaved, and a fly-blister to be applied to the entire scalp. March 31.—Morning visit. The patient is fast sinking. The pupils are irregularly dilated; the eyes hollow and sunken; the tongue cannot be projected; pulse 130 per minute, small and weak; the hands and feet are livid and cold; the abdomen is excessively tympanitic; there is a short, hacking cough. Auscultation reveals hypostatic congestion of the lungs. Slight bronchial rattles are audible. Discontinue all former treatment. R. Amm. carb. ℥ iss.; pulv. g. arab. ℥ ij.; tr. opii ʒj.; aq. dist. ℥ iv.; M. A tablespoonful every second hour. To have ℥ j. of sherry wine every third hour. Evening visit.—On approaching the patient's bed it became evident that he was dying. The countenance is haggard and death-like; the eyelids are half open, the eyeballs immovably fixed, and the cornea has a dull, glazed appearance; the pulse is very rapid, irregular, and hardly perceptible; deglutition is entirely lost; the surface is covered with a cold, clammy sweat; respiratory movements are short and rapid, and the bronchial rattles are audible all over the room. Died at five o'clock A.M., April 1st. N.B.—It is hardly necessary to state that during the latter part of the disease his urine was regularly drawn off by means of the catheter. *Sectio Cadaveris—ten hours after death.*—The brain and spinal cord alone were examined. The dura mater was attached to the arachnoid in several places by recent adhesions. The arachnoid was thickened, and had lost its glossy appearance throughout its whole extent. Between it and the pia mater was a yellow, purulent mass, which was accumulated in the sulci of the cerebrum. The vessels of the pia mater were enormously distended with black, fluid blood. The fluid in the subarachnoid space was slightly turbid, and in larger quantity than is usually found. The ventricles were not distended, nor did they present any unusual appearance. The arachnoid of the spinal cord was inflamed throughout its whole extent. In the region of the third or fourth dorsal vertebra was found a collection of thin pus, measuring about half an ounce. Here the substance of the cord was decidedly softened; above and below it appeared healthy. I have to add that the substance of the brain was congested. P.S.—On the morning of the patient's death, I was temporarily relieved from duty in this hospital, and sent to Madison, Indiana, in charge of some sick who were being transferred to that point. Consequently A. A. Surgeon R. Wirth had the kindness to perform the post-mortem operation, and the description of the lesions found is by him.

Case II.—Reported by R. Wirth, A. A. Surg. U.S.A.—Private John L. Smith, of Co. E, 74th Ohio Infantry, was admitted in the afternoon of March 25th, during my temporary absence from the hospital. I saw him about half an hour after admission, and found him *delirious* and unable to give an intelligent account of himself. From the steward I ascertained that he came from the barracks, and was on his way to the front. He had given his age as nineteen years, but could only with difficulty be prevailed on to state his place of residence, name of relations, etc. In fact, his mind was confused when he entered the hospital. In his delirium he pointed to his forehead and temples as the seat of violent pain; the face was flushed and dusky; the eyes injected, and the pupils fixed in a medium state of contraction; the tongue was covered with a white fur, which changed rapidly to a dry, brown crust; the pulse was rapid, full, but not hard; he breathed rapidly, but on examination of the chest, I found not the slightest evidence of inflammation. There was no vomiting nor pain in any part of the abdomen. His delirium was of a rather humorous character; he was very restless and wanted to get up, but was easily persuaded to keep his bed. In his attempts to get up, he staggered as if under the influence of intoxicating liquor. Ordered: the head to be shaved and cold applied; blood to be extracted from the temples and the nape of the neck by cups. R. Magn. sulph. ℥ j.; tart. emet., gr. j.; aquæ Oj; M. To be given at once. R. Tart. emetic. gr. vj.; potass. nitrat. ʒj.; aquæ ℥ iv.; M. Tablespoonful to be given every two hours. The cupping had not the slightest effect on his condition; the cold applications to his head seemed to ease him somewhat; at any rate, he did not resist or remove the cloth. During the night there was no appreciable change in his condition; he remained restless and did not sleep. His bowels had moved but once. March 26th, nine o'clock A.M.—His pulse was slightly reduced in frequency (from 130 to 120), and the pain in the head seemed to be less violent. As there was still great heat and dryness of skin, I ordered the medicine and cold applications to be continued, and cold, acid drinks given as often as he desired it. Though the tongue was very dry, he seemed not to suffer from thirst, and he drank water, milk, or lemonade, without apparently noticing the difference. During the night of March 26th to 27th, he was again restless and did not close his eyes. The report of the nurses was that he talked incessantly, and attempted repeatedly to get up. At nine o'clock, March 27th, I found him awake; his eyes looked dull and heavy, and the face somewhat paler; the teeth and lips were covered with black sordes, and the mouth filled with a tenacious mucus; he protruded his tongue at my request with difficulty, and seemed to have lost the control over it; though he talked continually, he could not articulate. The muscles of the neck were rigid and painful to the touch; the head was drawn back, and he cried out from pain when I made an attempt to bend it forward; he could not raise himself in bed, nor would he suffer himself to be raised. The pulse was considerably reduced in volume, but not in frequency; the bowels had not moved since the night before last; he had passed the urine twice in his bed, apparently in large quantities. On examination, I found the bladder almost empty. There were now visible on different parts of his body, but principally about the neck and upper part of the chest, dark-colored, irregular patches or spots of different hue and size. They were not elevated, and had the appearance of extravasated blood under a thick cuticle. Ordered: ℞. Olei ricini ℥ ij.; olei tiglii, gtt. iv.; M. Tablespoonful to be given until the bowels move. Emplastrum cantharidis over the whole scalp. Dry cups to be applied to the back, and afterwards croton oil to be rubbed along the spine. On the morning of the 28th I found the patient only weaker, otherwise not changed. The croton oil had had no effect on his bowels, nor did repeated irritant injections prove more successful. At about nine o'clock A.M. he fell asleep, which was looked upon as a favorable symptom; but it was soon apparent that the sleep partook of the nature of coma. For the first two or three hours it was possible to rouse him sufficiently to take some medicine; after that the coma rapidly deepened, and it became evident that he was dying. The pulse remained rapid until about an hour before death, when it became irregular, intermittent, and lost its frequency. He expired at half-past ten o'clock, P.M. *Post-Mortem examination—sixteen hours after death.*—On opening the cranium, the dura mater presented no evidence of disease. The arachnoid was thickened throughout, and *thick lymph* was collected in the grooves formed by the convolutions of the cerebrum. It appeared in larger quantities on the top than laterally. In the sub-

arachnoid spaces, at the base of the brain, there was an increased quantity of clear fluid. The lateral ventricles were not distended by fluid; but the posterior cornu of the right lateral contained a small quantity of pus or lymph. All the structures at the base of the brain were smeared over with lymph; least, however, on the cerebellum. The substance of the cerebrum was congested throughout, evidenced by the very numerous black spots appearing on cutting it. It was not softened nor otherwise changed. The blood in all the vessels had preserved its fluidity, and did not coagulate for several hours after it was exposed to the air. The arachnoid of the spinal marrow presented throughout its whole length, the same appearance as that of the brain; in other words, the inflammation of this membrane was general. The viscera of the thorax and abdomen were not examined.

Case III.—Reported by Dr. Wirth.—Wm. S. King, aged forty-six, walked on April 6th from the Nashville Depot to this hospital and applied for admission, stating that he was a citizen of Georgia, that he had been in the Southern army, but had taken the oath of allegiance, and had come to work for the Government. On informing him that he could not be admitted without an order from the Medical Director, he said, that in that case he would have to lie down in the street, as he was too sick to go any further. Seeing that he was very sick I ordered him to be taken to a ward. He went, however, first back to the R. R. Depot, where he had left his blankets, and brought them back without assistance. I state these facts simply to show the rapid course the disease took in this case. Postponing a more minute examination until he was brought to bed, I casually ascertained from him that he had come with the cars from Nashville and was taken sick on the road; that he felt pain in the head, neck, and back, and "in the bones" generally; the eyes were injected, and the face flushed. He had evidently fever, but he was perfectly rational, and walked alone up stairs without difficulty. *Half an hour afterwards I found him delirious*, and could elicit nothing more of his previous history. He seemed to suffer great pain, and moved constantly about in his bed, throwing off the cover, rising up and falling back again. The pulse was rapid but not strong. Though the eyes were congested and the face flushed, there was no appreciable increase of temperature about the head. I now suspected it to be a case of cerebro-spinal meningitis, and looked for the "spots," but discovered none. Ordered five cathartic pills to be given, the back to be cupped along the spine, afterwards friction with croton oil, and sinapisms to the calf of the leg and soles of the feet. Cold cloth to be applied to the head, which was, however, soon discontinued, as it seemed to distress him. During the afternoon he became somewhat quiet, and showed a tendency to sleep; but the pain seemed too severe to permit him to rest. For some minutes he would lie quiet, then suddenly start up as if frightened. He took no nourishment of any kind, and showed even indifference to drinks offered him. During the night his bowels moved, but it produced no change in his condition; strong sinapisms were left for hours on the legs without reddening the skin; he was kept in bed with difficulty. On examining him in the morning, I found on his neck, breast, and legs, dark red spots of irregular form and size; they were better marked and of a deeper hue than those observed lately in two other cases of the kind in this hospital; they were true petechiæ. At seven o'clock the pulse was not perceptible at the wrist, and it remained so until he died. He continued delirious, speaking and moving about incessantly; but all his movements indicated extreme weakness. He could not be induced to swallow anything. About six hours before death his head was drawn back, and could not be bent forward with a reasonable amount of force. At four o'clock P.M. he sank into coma, and died at 6½ o'clock, thirty hours after admission. Unfortunately no post-mortem examination was made in this case, the body having been taken away for interment before it could be examined.

American Medical Times.

SATURDAY, MAY 7, 1864.

MORTALITY IN HOSPITALS.

In the first lines of the preface to her admirable work, "Notes on Hospitals," Miss Nightingale remarks:—"It may seem a strange principle to enunciate as the very first requirement in an hospital that it should do the sick no harm." It does indeed seem strange that, in this day of the universal recognition of the necessity of hospitals, one of the ablest writers on this subject should lay down as the first principle in their construction that they do the sick no harm. We have been accustomed to regard the hospital as an asylum where every arrangement and appliance necessarily tended to restore the sick to health. To the temples of the ancients flocked the sick, the lame, the blind, as to shrines of health, to be healed of their infirmities. Out of this custom grew the modern hospital. Is it really true that, after centuries of experience, we have so far departed from the original idea in the establishment of hospitals that we need to be admonished of the real object of such institutions? Must we learn anew that hospitals are designed for the cure of the sick? Whoever calmly views this subject in the light of experience, must acknowledge that Miss Nightingale has stated a truth full of significance and deserving of the most serious consideration. It is too true, as she remarks, "that the actual mortality in hospitals, especially in those of large crowded cities, is very much higher than any calculation founded on the mortality of the same class of diseases amongst patients treated out of hospitals would lead us to expect." This is especially the case with those diseases classified under the general head of typhoid, as erysipelas, pyæmia, continued fevers, etc. Our large metropolitan hospitals always show an excess of deaths from these diseases. But there is a still more significant sense in which hospitals may be allowed to prove harmful to the sick, viz. by exposing them to local causes of diseases, which should never exist in a hospital. It now not unfrequently happens that patients enter general hospitals with simple diseases, but contract other maladies of a more fatal character, of which they die. The aggregate mortality of this class from fever and typhoid diseases in large city hospitals is not inconsiderable. In every lying-in ward or hospital we find striking proofs of the truth of this statement. Every life sacrificed from such causes is needlessly wasted.

The practical direction which we wish to give to these facts is upon those who are interested in the establishment of new hospitals. New York is about to add two large metropolitan hospitals to her existing institutions, viz. the Roosevelt Hospital, and a new Emigrant Hospital on Ward's Island. They are endowed with ample means, and the managers of these enterprises will doubtless spare no pains to render them models of excellence. But if the Boards of Management rightly estimate the value of properly constructed hospitals, they will realize that they have assumed no mean responsibility.

Let us briefly glance at some of the causes of excessive hospital mortality. First, and chiefly, is an insalubriou

location. A permanent general hospital should never be located in thickly settled parts of the town. The death-vapor which overhangs the crowded quarters of a large town affects most disastrously the sick congregated in hospital wards. This fact is strikingly shown in the vast difference of mortality between city and country hospitals. In England the rate of mortality in the country hospitals is considerably less than half that of the London hospitals. Secondly, hospitals should be so constructed as to give a large amount of air-space to each patient, with the rapid and constant renewal of air by night and day. No hospital is a proper residence of the sick which does not afford him a full and constant supply of fresh and pure air. We have not yet reached the ultimatum of hospital ventilation. By the means now employed the air in the centre of a ward is stirred, but we fail to flush the floors and sweep the corners with renewed currents of air. Thirdly, over-crowding is an evil closely allied to deficient ventilation. The statistics of hospitals show an exact correspondence of the rate of mortality with the number of patients in a single building. In a hospital with 100 inmates the chances of recovery from a given severe disease are one-third greater than in a hospital with 300 inmates. We see this fact strikingly illustrated in the difference in mortality between city and village hospitals. The former usually have 300 inmates, the latter rarely more than 25; while the mortality of the former is marked at 100 per cent. the latter is rated at less than 50 per cent. Finally, the admission of contagious and infectious diseases to general hospitals imperils the lives of the inmates. We have on several occasions pointed out the danger of admitting typhus to our large hospitals; it is a far more dangerous disease than small-pox, with our means of protection against the latter; but if small-pox were admitted, no other patients would consent to enter the same building. Still typhus too often finds free entrance to large hospitals, and always leaves its foot-prints. It seems to be a favorite theory with Miss Nightingale that typhus should be scattered through the wards of general hospitals, and some of the London hospitals follow the practice. The result has been that during the past year deaths from fever are reported in these hospitals among patients suffering from other maladies. Our experience in metropolitan hospitals admitting fever is, that, whether scattered or collected in a single ward, typhus is sure to claim its victims among other patients and attendants. The Governors of the New York Hospital have for several years rigidly excluded fever from its wards, and recently the Commissioners of Charities and Correction have determined upon the *establishment* of a Fever Hospital in connexion with the institutions under their charge.

In the establishment of the new hospital for the city, we trust the facts above stated will have due weight. The Roosevelt Hospital has not been located. The Commissioners of Emigration have an admirable site for the location of their buildings, and it will doubtless be adorned with a structure beautiful in architecture. But its real beauty will be in its interior construction and its adaptation to the recovery of the sick.

SUCCESS OF THE FLOATING HOSPITAL.

Few of the profession are aware of the fact that the Floating Hospital in our harbor is one of the institutions of which we have just occasion to be proud. It owes its existence and its success to medical men. On the destruction of the quarantine buildings, the Commissioners were at a loss what to do with the sick emigrants. The remedy was suggested by Dr. W. C. Anderson, of Staten Island, a gentleman of extensive and accurate knowledge of all that relates to quarantine, and one of the newly appointed quarantine Commission, who strongly recommended a floating hospital. His letter of March 1, 1859, on that subject is an able vindication of the scheme proposed, and led to its adoption. The hospital ship was put in order under the direction of Dr. Elisha Harris, who conducted it during the first year, and established its real value. It has now become, after five years of successful management, a permanent part of quarantine, as will be seen by the following extract from the law of last year:—"The floating hospital shall, from the first day of April to the first day of November, be appropriated exclusively to the care of persons sick with yellow fever; from the first day of November to the first day of April the floating hospital may be used for the care of typhus or ship fever; and until permanent provision shall be otherwise made by law, small-pox patients shall be sent to, and supported as at present at Blackwell's Island; and typhus or ship fever patients shall be sent to, and supported as at present at Ward's Island; and cholera patients shall be provided for by the commissioners of quarantine in such manner as they may determine, and occasion may demand."

MEETING OF THE AMERICAN MEDICAL ASSOCIATION.

The annual meeting of the American Medical Association is now near at hand, and it is desirable that all necessary preparation be perfected as rapidly as possible. It is the duty of the Committee of Arrangements to verify and report upon the credentials of membership, to receive and announce all essays and memoirs voluntarily communicated either by members of the Association or by others through them, and determine the order in which such papers are to be read and considered. To facilitate the business of the Association, it is very important that delegates throughout the entire country immediately forward to the Chairman, Dr. James Anderson, No. 30 University Place, their names and the title of the body which they represent. The delegates from the city of New York, Brooklyn, and adjacent towns, are requested to register their names in the records now at the residence of Dr. Anderson, when they will receive their tickets of membership. It is also very desirable that the authors of essays, reports, and memoirs report by letter to Dr. Anderson the titles of their papers, and the length of time it will require to read them. Preparations are being made to render this meeting one of the most pleasant and profitable ever held. There are abundant evidences that it will be largely attended.

COMMISSIONERS OF QUARANTINE.

We learn that one of the last acts of the New York Legislature was the appointment of the Commissioners to carry out the provisions of the quarantine law of 1863. The Commissioners are Dr. W. C. Anderson, of Richmond Co., Dr. R. Thompson, of Kings Co., and Mr. Cyrus Curtis, of New York. The *Richmond County Gazette* makes the following comments:—"The fifty-fourth section of the bill, as originally passed, provided that the Governor 'shall nominate, and by and with the advice and consent of the Senate appoint three discreet persons, citizens of the State, who shall be residents of the metropolitan police district, who

shall be Commissioners of Quarantine for the purposes of this act,' etc. The bill was not signed until after the adjournment of the Senate, consequently the Commissioners were not appointed, and the act remained a dead letter during the past year. The whole management of quarantine was left to the discretion of the Health Officer, with a supervisory power in the Board of Health of New York under the old health laws. The act had legislated the old commission out. They had done all that they were permitted to do under the previous law of removal. They had provided the floating hospital for the treatment of yellow fever patients. They had removed from this island, and given to small-pox and ship fever patients a new direction altogether. This arrangement was an immense advance over the system that formerly prevailed, and equally consistent with humanity to the unhappy patients brought into our waters, and with good neighborhood and security to all concerned. Having effected these improvements as temporary measures, the old Commissioners could proceed no further without more power than the old law conferred."

Obituary.

JOHN REDMAN COXE, M.D.

Dr. Coxe was the oldest graduate of the Medical Department of the University of Pennsylvania, in which institution he was for many years a Professor. He was born in Trenton, New Jersey, on the 16th of September, 1773. He was educated in Philadelphia, under the charge of his grandfather, Dr. John Redman, until his tenth year, when he went to England, where he remained at school until his seventeenth year, when he went to Edinburgh to complete his classical education; while there he attended a course of medical lectures at the University. He returned to America in 1790, and at once commenced the regular study of medicine with Dr. Benjamin Rush, with whom he remained until 1794, when he received his diploma. While with Dr. Rush he was actively engaged in practice during the severe visitation of the yellow fever in 1793, at which time three of his five fellow-students died of the fever. Immediately after graduating he went to London, and became a house-pupil at the London Hospital, and remained there nearly a year. He then went to Edinburgh, and attended a course of lectures at the University; thence to Paris, where he pursued his medical studies for three months. He then returned to London, where he spent several months in the hospitals. He returned to the United States, and settled in Philadelphia in the winter of 1796–7, when he at once entered upon the active practice of the profession for which he had been so carefully preparing himself for many years of study.

Dr. Coxe was appointed, by the Board of Health, physician to the port during the second visitation of the yellow fever, in 1798. He was for several years one of the physicians of the Pennsylvania Hospital, and also of the Philadelphia Dispensary. He was largely engaged in private practice, when, in 1809, he was elected Professor of Chemistry in the University of Pennsylvania, from which chair he was transferred, in 1818, to that of materia medica and pharmacy, which he held until 1835. For many years he has been leading the quiet and retired life of a student. Dr. Coxe was one of the earliest introducers of vaccination into the United States, and was the first to introduce it into this city. His name has for more than half a century been a household word in connexion with the Hive Syrup (*Syrupus Scillæ Compositus*, U. S. P.) which he invented, and which has proved such an inestimable blessing to thousands. He has passed away quietly, without disease, at the advanced age of ninety years and six months, having never been sick in all that time.—*Reporter.*

FRANKLIN BACHE, M.D.

Dr. Bache, one of the most eminent physicians of Philadelphia, died after a brief illness on the 19th April. He was in the seventy-second year of his age, having been born in Philadelphia in 1792. During the greater part of his long and industrious life he was professionally connected with various public institutions of our city. At the age of eighteen he graduated at the University of Pennsylvania as Bachelor of Arts, and four years afterwards received his degree in the medical department of the same institution. After spending a year in the army as surgeon's mate, and two years as full surgeon, he resigned his commission and commenced practice in this city. From 1824 to 1836 he was Physician to the Walnut Street Prison; from 1826 to 1832 a Professor of Chemistry in the Franklin Institute; from 1829 to 1839 Physician to the Eastern Penitentiary; from 1831 to 1841 Professor of Chemistry in the Philadelphia College of Pharmacy; and in 1841 he was appointed a Professor of Chemistry in the Jefferson Medical College. This last-mentioned position he held during the remainder of his life, and performed the duties connected with it in the most active and efficient manner. Prof. Bache was also formerly President of the American Philosophical Society, and at the time of his death was President of the Deaf and Dumb Asylum. He has written a number of valuable works on medicine and chemistry, of which the United States Dispensatory, by Dr. George B. Wood and himself, is the most celebrated. As a member of the Publishing Committee of the United States Pharmacopœia, he also contributed much of the most valuable matter contained in that work. His labors extended almost to the date of his death, his last illness being quite short. He attended to his duties during the whole of the last session of the Jefferson College, and was even at the party which was given on the evening of the last commencement of that institution, on the 10th of this month. Professor Bache was the eldest son of the eldest grandchild of Benjamin Franklin, a brother of Colonel Hartman Bache, of the United States Engineer Corps, and a first cousin of Professor A. D. Bache, Superintendent of the Coast Survey. A daughter and four sons survive him, three of his sons being in the Government service. By the death of Prof. Bache Philadelphia loses a learned and scientific physician, one who did much towards maintaining her character as a centre of medical knowledge.—*Reporter.*

Army Medical Intelligence.

(CIRCULAR LETTER.)

Surgeon-General's Office,
Washington, D.C., April 23, 1864.

The following Order from the War Department is respectfully furnished for your information and guidance.

By order of the Acting Surgeon-General:

C. H. Crane, *Surgeon, U.S.A.*

War Department, Adjutant-General's Office,
Washington, D.C., March 29, 1864.

GENERAL ORDERS, No. 127.

I. Medical Directors of Departments will establish a General Hospital, at some convenient point within their respective Departments, for the reception and treatment of sick and wounded officers, but no expenditures for the construction of new hospitals for this purpose will be incurred without special authority. They will detail a Surgeon-in-Charge, who will make requisitions upon the Medical Purveyor for medicines, hospital stores, furniture, &c., according to the standard Supply Table of the Medical Department, and will hire the nurses, cooks, and laundresses

required. Hospital Stewards assigned to Officers' General Hospitals will be paid on the regular muster and pay rolls.

II. On the recommendation of the Medical Director of the Department, a commissioned medical officer will be detailed to act permanently as Treasurer for each Officers' General Hospital, who shall not be removed without sufficient cause. The Treasurer shall have the custody of the funds of the Hospital, and shall perform such duties in relation to collecting, disbursing, and accounting for the same, and such other duties as may be prescribed by the Surgeon-General.

III. On the last day of each calendar month, and immediately on leaving the Hospital, by return to duty, furlough, or otherwise, each officer shall pay to the Treasurer the sum of one dollar for each and every day he has been in the Hospital, and for which he has not already paid as herein provided. When an officer has employed a special attendant, he shall pay thirty cents a day additional for each day such attendant was subsisted in the Hospital. Company officers of volunteers, while in such Officers' General Hospital, shall be considered as "on detached service without troops," for the purpose of drawing their pay and settling their indebtedness to the Hospital, and may be paid on separate pay accounts, instead of on the muster and pay rolls.

IV. When an officer is not provided with money, and is unable to obtain it, he will give a certificate of indebtedness, in triplicate, to the Treasurer of the Hospital, in such form as shall be prescribed by the Surgeon-General, for the amount due from him to the Hospital. The Treasurer shall immediately forward, for stoppage, two copies of the certificate to the Chief Paymaster of the Pay District in which the Hospital may be located, retaining the remaining copy for his own reference and security. When an officer is discharged from the Hospital to return to a regiment serving beyond the limits of the Pay District in which such Hospital is located, the Treasurer shall forward the certificates of indebtedness which the officer may have given to the proper Chief Paymaster, if known to him, otherwise to the Paymaster-General, for such reference.

V. The Chief Paymaster of the Pay District will immediately cause the certificates of indebtedness to be placed in the hands of the Paymaster of the Hospital (or of the regiment, should the officer have left the Hospital), with instructions to stop the amounts on the first payment of the officers by whom the certificates were given. The Paymaster will take the receipt of each officer for the full amount of his pay account, and transmit the deducted sums to the Treasurer of the Hospital to which they are due, who will endorse receipt therefor upon the duplicate certificates in the Paymaster's hands, or furnish duplicate abstracts of receipts signed by him, and embracing in one receipt the names of all the officers on whose accounts the sums have been remitted. The Paymaster will also forward monthly an abstract of certificates thus paid to the Surgeon-General.

VI. Officers of the Subsistence Department will make *separate* abstracts of the sales to each Officers' General Hospital during each calendar month, and will report the same to the Commissary General of Subsistence in the manner provided by regulations in relation to sales to officers. Payment for stores thus purchased of the Subsistence Department shall be made by the Treasurer monthly, and in cash, when practicable; but when the Treasurer has not money on hand sufficient to liquidate the entire indebtedness of the Hospital to the Subsistence Department, he shall give to the Commissary accountable for the stores sold a certificate of indebtedness, in duplicate, for the amount remaining unpaid, which certificate shall be a valid claim against the Hospital, and be paid from the first moneys received thereafter by the Treasurer, and until paid shall be considered as a sufficient cash voucher to the Commissary for the amount stated therein. When the Treasurer pays this certificate of indebtedness he shall take the receipt of the Commissary for the amount thus paid him, and shall report his action in this matter to the Commissary General of Subsistence, stating the date and amount of each certificate thus cancelled, the name of the Commissary receiving the money therefor, etc.

VII. Medical Directors of Armies in the field, when necessary, will establish temporary Hospitals in the rear of such armies, to be governed by the above regulations. Medical Directors of Armies and of Departments and Medical Inspectors will frequently inspect Officers' General Hospitals, and in addition to the usual course of hospital inspection, they will investigate the manner in which the Treasurer performs his duties, and promptly report any neglect on his part to the Surgeon-General.

VIII. No officer whose certificate of indebtedness to a Hospital remains unpaid by him shall receive pay without deducting therefrom the amount of this indebtedness and leaving it in the hands of the Paymaster, who shall give him duplicate receipts therefor, one of which the officer shall immediately forward to the Treasurer of the Hospital for which the stoppage is made. A violation of this paragraph will subject the officer so offending to court-martial for disobedience of orders.

IX. When an officer dies in Hospital, the Treasurer shall immediately ascertain the amount of his indebtedness to the Hospital, and prepare an account thereof in triplicate, which shall be certified to be correct by both the Treasurer and the Surgeon-in-charge. One copy of this account shall be retained by the Treasurer, and the remaining two copies be forwarded to the Second Auditor of the Treasury, in order that, upon the final settlement of the officer's accounts, the amount of his indebtedness may be deducted from any pay due him, and remitted to the Treasurer of the Hospital.

By order of the Secretary of War:

E. D. Townsend,
Assistant Adjutant-General.

CIRCULAR, No. 8.

Medical Inspector-General's Office,
Washington, D.C., March 1, 1864.

Medical Inspectors, hereafter ordered from one District to another, will turn over to the succeeding officer, or leave in the office, all records and official papers (or copies of the same) relating to the business of the District or Department.

A neglect of this course has already given rise to some confusion and irregularity.

Jno. M. Cuyler,
Acting Medical Insp.-General, U.S.A.

CIRCULAR, No. 9.

Medical Inspector-General's Office,
Washington, D.C., April 12, 1864.

As the season for active operations of the army in the field is rapidly approaching, Medical Inspectors will promptly ascertain whether the troops are well provided with Medical Officers, medical and hospital supplies, transportation, etc., for the sick and wounded, and report the result to this Office, in order that any deficiencies may be brought to the attention of the Surgeon-General in time to have them corrected.

Very respectfully, your obedient servant,

Jno. M. Cuyler,
Acting Medical Inspector-Gen., U.S.A.

ORDERS, CHANGES, &c.

ASSIGNMENTS.

Surgeon Bache on being relieved will report in person without delay to the Commanding General, Department of the Susquehanna, for duty in the City of Philadelphia.

Surgeon Caleb W. Horner, U.S.V., is relieved from duty at Nashville, Tenn., and will report in person to the Surgeon-General at Washington for special duty.

Assistant-Surgeon W. M. Notson, U.S.A., will report in person for duty to Surgeon Basil Norris, U.S.A., Attending Surgeon to Officers of the Regular Army, at Washington, D.C.

Hospital Steward Frederick Schrack, U.S.A., has been assigned to duty with Colored Troops in the Army of the Cumberland.

Surgeon A. T. Watson, U.S.V., has been assigned to the charge of Branches C and D, Crittenden General Hospital, Louisville, Ky.

Acting Assistant-Surgeon C. E. Witham, U.S.A., to duty in Branch C, Crittenden General Hospital, Louisville, Ky.

Surgeon J. T. Heard, U.S.V., to duty as Surgeon-in-Chief, Artillery Reserve, Army of the Potomac.

Surgeon A. M. Wilder, U.S.V., to duty as Medical Director, 23d Army Corps.

Surgeon P. A. O'Connell, U.S.V., to duty as Medical Director, 9th Army Corps.

Assistant-Surgeon Andrew H. Smith, U.S.A., as Medical Purveyor, District of Arizona, N. M.

Surgeon George H. Oliver, U.S.V., as Attending Surgeon, Fort Craig, N. M.

Surgeon W. H. Thorn, U.S.V., as Surgeon-in-charge, General Hospital No. 19, Nashville, Tenn.

Surgeon Chas. E. Swasey, U.S.V., as Surgeon-in-charge, General Hospital, Fort Smith, Ark.

Surgeon John W. Foye, U.S.V., as Surgeon-in-Chief, 2d Division, 4th Corps, Army of the Cumberland.

Surgeon S. D. Freeman, U.S.V., as Medical Director, Indian Expedition commanded by General Sully.

Hospital Steward F. Hogarth, U.S.A., to the Indian Expedition to Idaho Territory.

Hospital Steward C. McCarthy, U.S.A., to the Army of the Potomac.

Hospital Steward O. Beck, U.S.A., to the Department of Missouri.

Surgeon C. N. Chamberlain, U.S.V., as Surgeon-in-Chief, 4th Division, 5th Corps, Army of the Potomac.

Surgeon J. H. Currey, U.S.V., as Surgeon-in-Chief, 2d Separate Brigade, 8th Corps, Baltimore, Md.

Surgeon Wm. Hayes, U.S.V., as Surgeon-in-Chief, 1st Division, Forces of West Virginia.

Assistant-Surgeon Frank Reynolds, U.S.V., as Surgeon in-charge, Cavalry Corps Hospital, Army of the Potomac.

Assistant-Surgeon Alfred B. Huested, 21st New York Cavalry, to the 1st Division, Forces of West Virginia.

Surgeon A. C. Schwarzwelder, U.S.V., as Surgeon-in-charge, Eruptive Fever Hospital, Louisville, Ky.

Surgeon J. E. McDonald, U.S.V., as Medical Director, 9th Army Corps, New York.

Surgeon F. H. Gross, U.S.V., as Surgeon-in-charge of Hospital at Camp Parole, Annapolis, Md.

Surgeon E. B. Dalton, U.S.V., as Medical Inspector of the Army of the Potomac.

Surgeon S. B. Davis, U.S.V., as Medical Inspector and Superintendent of Hospitals, Department of Kansas.

Surgeon William Grinstead, U.S.V., as Surgeon-in-Chief, 2d Division, 11th Army Corps, Department of the Cumberland.

Surgeon Wm. Threlkeld, U.S.V., to Nashville, Tenn.

Surgeon G. S. Palmer, U.S.V., as Medical Director, 11th Army Corps, Department of the Cumberland.

Surgeon S. E. Fuller, U.S.V., as Attending Surgeon, Sick Refugees at Nashville, Tenn.

Surgeon J. W. Lawton, U.S.V., to the Department of the Ohio.

Surgeon J. H. Phillips, U.S.V., as Surgeon-in-Chief, 2d Division, 14th Army Corps, Department of the Cumberland.

Assistant-Surgeon W. B. Trull, to Louisville, Ky.

Assistant-Surgeon W. O. McDonald, to duty with the 1st and 2d Battalion, 16th U.S.I., 14th Army Corps, Department of the Cumberland.

Hospital Steward E. J. Doe, U.S.A., to Office of the Medical Director, Northern Department, Columbus, Ohio.

Hospital Steward C. Nall, U.S.A., to Fort Wayne, Mich.

Surgeon C. McMillin, U.S.V., to special duty, examining recruits at New York city.

Assistant-Surgeon G. P. Jaquett, U.S.A., to McDougall Barracks, Fort Schuyler, N. Y.

Assistant-Surgeon J. C. Baily, U.S.A., to the General Hospital, Fort Columbus, New York Harbor.

Assistant-Surgeon S. H. Horner, U.S.A., as Medical Purveyor, Department of the Ohio, Knoxville, Tenn.

Assistant-Surgeon Dallas Bache, U.S.A., as Assistant Medical Inspector, Department of the Cumberland, Nashville, Tenn.

Surgeon W. Hayes, U.S.V., as Medical Director, Sullivan's Division, Department of West Virginia.

Surgeon G. H. Hubbard, U.S.V., as, Medical Director in the field, Department of Arkansas.

Surgeon A. Major, U.S.V., to duty in General Hospitals, Beaufort, S. C.

Surgeon S. D. Carpenter, U.S.V., as Medical Director, District of St. Louis, Mo.

Surgeon J. R. Ludlow, U.S.V., as Surgeon-in-Chief, 2d Division, 4th Corps, Army of the Cumberland.

Surgeon S. J. W. Mintzer, U.S.V., to Nashville, Tenn.

Hospital Chaplain W. C. Smith, U.S.A., to General Hospital, Ashland, Ky.

Acting Assistant-Surgeon G. J. Park, U.S.A., to General Hospital, Leavenworth city, Kansas.

Surgeon James W. Foye, U.S.V., as Surgeon-in-Chief, 1st Division, 12th Corps, Army of the Cumberland.

Surgeon W. Threlkeld, U.S.V., as Surgeon-in-charge, General Hospital, Tullahoma, Tenn.

Surgeon H. A. Schlaefflin, U.S.V., to the Marine General Hospital, New Orleans, La.

Surgeon J. B. Morrison, U.S.V., as Surgeon-in-Chief, Ames' Division, Jacksonville, Fla.

Assistant-Surgeon R. McGowan, U.S.V., to the Reserve Artillery, Knoxville, Tenn.

Surgeon John L. Teed, U.S.V., to the Cumberland Hospital, Nashville, Tenn.

Assistant-Surgeon Wm. Carroll, U.S.V., as Surgeon-in-Chief, 2d Brigade, Reserve Artillery, Army of the Potomac.

Hospital Steward C. L. Cumming, U.S.A., to the U. S. Laboratory, Philadelphia, Pa.

Hospital Steward E. Alexander, U.S.A., to the General Hospital, Central Park, New York.

Hospital Steward D. S. Bolsenger, U.S.A., to the 5th Regiment U. S. Colored Troops.

Surgeon F. N. Burke, U.S.V., as Health Officer at Memphis, Tenn.

Hospital Steward Chas. V. Sands, U.S.A., to the 1st Regiment U. S. Colored Troops.

AMENDED ORDERS.

So much of Special Orders No. 116, March 12, 1864, from the War Department, as dismissed Surgeon E. L. Fenham, 10th Missouri Cavalry, is amended so as to read: Surgeon E. L. Feehan.

So much of Special Orders No. 107, of March 5, 1864, from the War Department, as relates to Surgeon John F. Head, U.S.V., is revoked, and Surgeon John F. Head, U.S.A., in addition to his present duties as a member of the Board now in session at Cincinnati, Ohio, for the examination of sick officers, is assigned to duty as member of the Board now in session in that city for the examination of Assistant-Surgeons of Volunteers.

MISCELLANEOUS.

Hospital Steward J. Nebrich, U.S.A., has been ordered before a Board now in session at Washington, D.C., for examination for promotion.

Surgeon G. W. Hogeboom, U.S.V., has arrived at Springfield, Mo., and entered upon his duties as Medical Director, District of South-West Missouri.

Surgeon John O. Bronson, U.S.V., has arrived at Fort Humboldt, Cal., and entered upon his duties as Attending Surgeon at that Post.

There are a large number of vacancies existing in the Corps of Surgeons and Assistant-Surgeons of Volunteers, and in the Colored Regiments the need of Assistant-Surgeons is urgent.

The U. S. General Hospital at Gallipolis, Ohio, is transferred to the Department of West Virginia.

Surgeon J. D. Strawbridge, U.S.V., has been ordered to Camp Copeland, Pa., to examine certain recruits rejected by the mustering officer at that place as unfit for service.

Surgeon B. Beust, U.S.V., is sick at Louisville, Ky.

Assistant-Surgeon H. C. Roberts, U.S.V., has returned from leave of absence, and is sick at Norfolk, Va.

Surgeon W. M. Chambers, U.S.V., has returned from leave, and resumed his duties as Surgeon-in-charge, General Hospital No. 15, Nashville, Tenn.

General Hospital No. 1, at Paducah, Ky., was destroyed by order of Colonel Hicks, commanding, as it afforded shelter to the sharpshooters of the rebel General Forrest's command, in the late attack on that place, whence they killed our gunners in the fort. The patients were all safely removed. General Hospitals Nos. 2, 3, and 4 suffered no damage.

Surgeon R. M. S. Jackson, U.S V., is in New York city on duty connected with the Department of Ohio.

Surgeon N. P. Rice, U.S.V., is at Division No. 1, General Hospital, Annapolis, Md., sick.

Hospital Steward Mark H. Woodbury, U.S.A., now on duty at Augusta, Me., has been reduced to the ranks, and will be sent under guard to Fort Columbus, N. Y. H., as a general service recruit.

So much of Special Orders No. 99, current series, War Department, as dismissed Hospital Chaplain John A. Spooner, U.S.A., has been revoked, and he has been allowed to resign from February 8, 1864.

The Assistant Surgeon-General at Louisville, Ky., has directed Surgeon Thomas W. Fry, U.S.V., Superintendent of Hospitals at New Albany, Ind., to select a suitable building at the latter place, and fit it up in first-class style for the reception of sick and wounded soldiers of African descent.

Medical News.

At a meeting of the Bellevue Medical Union, composed of the Hospital Staff, held April 25, 1864, the following resolutions were unanimously adopted:—

Whereas, our associate, Dr. George Clinton Dewey, has lost his life by pestilential disease, while performing his professional duty:

Resolved, That we have thus been deprived of a kind friend and fellow-laborer, the profession of one of its ornaments, and science of an earnest and faithful life.

Resolved, That while we deeply sympathize with the family and friends of the deceased, and share their loss, we shall ever remember with pleasure the qualities of his mind and heart which bound him to us.

Resolved, That a copy of these resolutions be sent to the family, and to the American Medical Times for publication.

S. D. Wadsworth,
Bayly Done,
Russ. B. Brownell.

The Second Annual Meeting of the *Medical Association of the Eastern District of Brooklyn* was held February 18, 1864, when the following officers were by ballot duly elected to serve for the ensuing year:—President, Edwin N. Colt, M.D.; Vice-President, Nelson L. North, M.D.; Secretary, J. Joseph Acheson, M.D.; Treasurer, Edward Malone, M.D. There were also appointed the usual standing committees; and two delegates to the American Medical Association have been elected. The Association has about twenty members, and is in a flourishing condition, holding regular meetings on the third Thursday of each month at their rooms in the Williamsburgh Dispensary building. We are glad to feel that this organization has become a permanent institution, as its necessity has long been felt by the medical men of Williamsburgh and vicinity.

COMMUNICATIONS HAVE BEEN RECEIVED FROM H. Allen, Assistant-Surgeon U.S.A.; Roberts Bartholow, Assistant-Surgeon U.S.A.; and D. C. Peters, M.D., U.S.A.

DIED.—In this city, April 26, Joseph Martin, M.D., of typhus fever, aged 67 years. Dr. M. had been a successful practitioner of medicine in this city for more than 20 years, was an honored member of the Academy of Medicine, and his loss will be deeply felt.

METEOROLOGY AND NECROLOGY OF THE WEEK IN THE CITY AND COUNTY OF NEW YORK.

Abstract of the Official Report.

From the 18th day of April to the 25th day of April, 1864.

Deaths.—Men, 95; women, 99; boys, 132; girls, 120. Children born of native parents, 38; foreign, 182; not stated, 32; total, 446. Adults, 194; children, 252; males, 227; females, 219; colored persons, 6. Infants under two years of age, 158.

Among the causes of death we notice:—Erysipelas, 8; albuminuria, 3; apoplexy, 9; infantile convulsions, 26; croup, 14; diphtherite, 14; scarlet fever, 22; puerperal fever, 3; typhus and typhoid fevers, 29; consumption, 56; small-pox, 4; measles, 8; dropsy in head, 20; infantile marasmus, 20; whooping-cough, 5; inflammation of brain, 16; of bowels, 12; of lungs, 42; bronchitis, 9; diarrhœa and dysentery, 13. 258 deaths occurred from acute diseases, and 37 from violent causes. 307 were native, and 139 foreign; of whom 88 came from Ireland; 45 died in the City Charities; of whom 14 were in Bellevue Hospital.

Abstract of the Atmospherical Record of the Eastern Dispensary, kept in the Market Building, No. 57 Essex street, New York.

April 1864.	Minimum Temp'ture	SIX A.M. Temperature.	SIX A.M. Evaporation Below.	SIX A.M. Barometer.	SIX A.M. Wind.	TWO P.M. Temperature.	TWO P.M. Evap. Below.	TWO P.M. Barometer.	TWO P.M. Wind.	TEN P.M. Temperature.	TEN P.M. Evap. Below.	TEN P.M. Barometer.	TEN P.M. Wind.
	°	°				°				°			
17th.	37	40	4	29.61	N.	55	8	29.70	W.	43	5	29.77	W.
18th.	38	41	4	29.80	N.W.	58	8	29.81	W.	45	5	29.86	W.
19th.	36	38	4	29.85	N.W.	50	5	29.88	N.E.	44	5	29.90	N.E.
20th.	35	36	4	29.82	N.E.	46	5	29.81	N.	40	4	29.82	S.
21st.	40	43	3	29.88	N.W.	52	5½	29.91	N.	41	4	30.01	N.
22d.	44	48	3	30.10	N.W.	60	7	30.21	S.	42	4	30.20	S.E.
23d.	45	50	1	30.21	N.E.	63	6½	30.06	S.E.	46	3	30.01	S.E.

REMARKS.—17th, 18th, and 19th, Mostly clear, with fresh wind. 20th, Clear A.M., cloudy P.M., wind mostly fresh. 21st, Variable all day. 22d, Clear A.M., cloudy P.M., wind mostly fresh. 23d, Very light rain A.M., variable sky P.M.

TERMS OF THE AMERICAN MEDICAL TIMES.

City and Canadian Subscribers, $3.50 per annum, payable in advance.
Mail Subscribers, $3 per annum, payable in advance.
Remittances must accompany an order for the Journal.
The Publishers will not hold themselves responsible for the loss of moneys inclosed in unregistered letters.
There are two volumes a year, commencing on the 1st of January and July; but subscriptions may begin at any date.
Those who desire to have the series complete can be supplied with the back numbers at the original subscription price.
The last volume, nicely bound in cloth, may be had at the office, for $2 00, and free by mail for $2.32; cloth cases for binding may be had at the office for 25 cents, and free by mail for 34 cents.

*** THE MEDICAL TIMES is published every Saturday morning, and is transmitted direct by mail throughout every section of the country. As a medium for immediate communication with the medical profession of the United States, it offers unsurpassed facilities to those desiring to advertise Medical Colleges and Schools, late Works, Surgical Appliances, Instruments of every kind, Drugs and Medicines, etc., etc. The following terms of transient advertisements may be modified by special contract for permanent insertion:

¼ column, or less, ...	each insertion	$1 00
½ "	"	1 80
¾ "	"	3 60
1 "	"	7 20

A deduction of 10 per cent is made for 6 insertions.
" 25 " " " 13 "
" 30 " " " 26 "
" 35 " " " 52 "

Communications should be addressed "Office American Medical Times, 520 Broadway, N. Y." BAILLIERE BROTHERS,

Publishers and Proprietor.